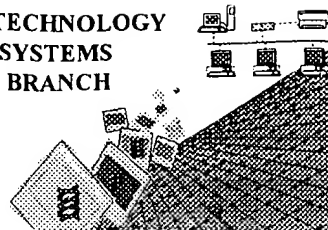


BIOTECHNOLOGY  
SYSTEMS  
BRANCH



1646

**RAW SEQUENCE LISTING**  
**ERROR REPORT**

RECEIVED

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) detected errors when processing the following computer readable form:

JUL 08 2002  
TECH CENTER 1600/2900

Application Serial Number: 09/732,436C  
Source: 1646  
Date Processed by STIC: 6/10/2002

THE ATTACHED PRINTOUT EXPLAINS DETECTED ERRORS.

PLEASE FORWARD THIS INFORMATION TO THE APPLICANT BY EITHER:

- 1) INCLUDING A COPY OF THIS PRINTOUT IN YOUR NEXT COMMUNICATION TO THE APPLICANT, WITH A NOTICE TO COMPLY or,
- 2) TELEPHONING APPLICANT AND FAXING A COPY OF THIS PRINTOUT, WITH A NOTICE TO COMPLY

FOR CRF SUBMISSION QUESTIONS, PLEASE CONTACT MARK SPENCER, 703-308-4212.

FOR SEQUENCE RULES INTERPRETATION, PLEASE CONTACT ROBERT WAX, 703-308-4216.

PATENTIN 2.1 e-mail help: [patin21help@uspto.gov](mailto:patin21help@uspto.gov) or phone 703-306-4119 (R. Wax)

PATENTIN 3.0 e-mail help: [patin3help@uspto.gov](mailto:patin3help@uspto.gov) or phone 703-306-4119 (R. Wax)

TO REDUCE ERRORED SEQUENCE LISTINGS, PLEASE USE THE **CHECKER** VERSION 3.1 PROGRAM, ACCESSIBLE THROUGH THE U.S. PATENT AND TRADEMARK OFFICE WEBSITE. SEE BELOW FOR ADDRESS:

<http://www.uspto.gov/web/offices/pac/checker>

Applicants submitting genetic sequence information electronically on diskette or CD-Rom should be aware that there is a possibility that the disk/CD-Rom may have been affected by treatment given to all incoming mail.

Please consider using alternate methods of submission for the disk/CD-Rom or replacement disk/CD-Rom.

Any reply including a sequence listing in electronic form should NOT be sent to the 20231 zip code address for the United States Patent and Trademark Office, and instead should be sent via the following to the indicated addresses:

1. EFS-Bio (<<http://www.uspto.gov/ebc/efs/downloads/documents.htm>> , EFS Submission User Manual - ePAVE)

2. U.S. Postal Service: U.S. Patent and Trademark Office, Box Sequence, P.O. Box 2327, Arlington, VA 22202

3. Hand Carry directly to:

U.S. Patent and Trademark Office, Technology Center 1600, Reception Area, 7<sup>th</sup> Floor, Examiner Name, Sequence Information, Crystal Mall One, 1911 South Clark Street, Arlington, VA 22202

Or

U.S. Patent and Trademark Office, Box Sequence, Customer Window, Lobby, Room 1B03, Crystal Plaza Two, 2011 South Clark Place, Arlington, VA 22202

4. Federal Express, United Parcel Service, or other delivery service to: U.S. Patent and Trademark Office, Box Sequence, Room 1B03-Mailroom, Crystal Plaza Two, 2011 South Clark Place, Arlington, VA 22202

Revised 01/29/2002

RECEIVED  
JUL 08 2002  
TECH CENTER 1600/2900



1646

## RAW SEQUENCE LISTING

DATE: 06/10/2002

PATENT APPLICATION: US/09/732,436C

TIME: 16:25:37

Input Set : A:\Cura-611.app

Output Set: N:\CRF3\06102002\I732436C.raw

pp 6-9

**Does Not Comply**  
**Corrected Diskette Needed**

```

3 <110> APPLICANT: Prayaga, Sudhirdas
4      Shimkets, Richard
6 <120> TITLE OF INVENTION: NOVEL INTERFERON OMEGA AND NUCLEIC ACIDS ENCODING SAME
8 <130> FILE REFERENCE: 15966-615
10 <140> CURRENT APPLICATION NUMBER: 09/732,436C
11 <141> CURRENT FILING DATE: 2000-12-07
13 <150> PRIOR APPLICATION NUMBER: 60/169,887
14 <151> PRIOR FILING DATE: 1999-12-09
16 <150> PRIOR APPLICATION NUMBER: 60/170,230
17 <151> PRIOR FILING DATE: 1999-12-10
19 <160> NUMBER OF SEQ ID NOS: 22
21 <170> SOFTWARE: PatentIn Ver. 2.1
23 <210> SEQ ID NO: 1
24 <211> LENGTH: 475
25 <212> TYPE: PRT
26 <213> ORGANISM: Artificial Sequence
28 <220> FEATURE:
29 <223> OTHER INFORMATION: Description of Artificial Sequence: Curagen clone
30      AC015663_A
32 <400> SEQUENCE: 1
33 Ala Cys Cys Ala Ala Thr Gly Gly Thr Cys Thr Cys Cys Thr Thr Gly
34 1      5      10      15
36 Cys Thr Gly Gly Thr Gly Gly Cys Ala Thr Thr Gly Gly Thr Gly Ala
37      20      25      30
39 Thr Gly Ala Thr Cys Thr Cys Cys Thr Gly Cys Cys Ala Cys Ala Thr
40      35      40      45
42 Cys Thr Ala Thr Thr Cys Cys Cys Thr Thr Thr Thr Cys Thr Gly Cys
43      50      55      60
45 Gly Ala Cys Cys Thr Gly Cys Cys Thr Ala Ala Ala Gly Cys Thr Cys
46 65      70      75      80
48 Ala Gly Gly Thr Gly Ala Thr Thr Thr Cys Thr Gly Cys Cys Cys Thr
49      85      90      95
51 Cys Cys Ala Thr Ala Ala Gly Ala Thr Gly Cys Ala Cys Cys Ala Gly
52      100     105     110
54 Cys Ala Gly Ala Thr Cys Thr Thr Cys Ala Gly Cys Cys Thr Cys Thr
55      115     120     125
57 Thr Thr Thr Thr Ala Cys Ala Cys Ala Ala Gly Gly Gly Cys Thr Thr
58      130     135     140
60 Gly Thr Cys Thr Gly Ala Thr Gly Cys Thr Thr Gly Gly Ala Ala Thr
61 145     150     155     160
63 Ala Gly Gly Gly Cys Cys Thr Thr Cys Cys Thr Gly Gly Ala Cys Ala
64      165     170     175
66 Ala Ala Cys Thr Cys Cys Ala Gly Ala Cys Thr Gly Gly Ala Thr Thr

```

## RAW SEQUENCE LISTING

DATE: 06/10/2002

PATENT APPLICATION: US/09/732,436C

TIME: 16:25:37

Input Set : A:\Cura-611.app

Output Set: N:\CRF3\06102002\I732436C.raw

```

67          180          185          190
69 Thr Cys Ala Thr Cys Ala Gly Cys Ala Gly Cys Thr Gly Gly Ala Ala
70          195          200          205
72 Gly Ala Cys Cys Thr Gly Gly Ala Gly Ala Cys Cys Thr Gly Cys Thr
73          210          215          220
75 Thr Thr Gly Gly Thr Ala Thr Ala Gly Ala Gly Gly Ala Thr Gly Gly
76 225          230          235          240
78 Gly Ala Ala Gly Cys Ala Ala Gly Ala Gly Thr Cys Thr Gly Cys Cys
79          245          250          255
81 Cys Thr Gly Gly Ala Ala Ala Thr Thr Gly Ala Gly Gly Gly Cys Cys
82          260          265          270
84 Cys Thr Ala Cys Ala Cys Thr Gly Gly Cys Cys Ala Thr Ala Ala Ala
85          275          280          285
87 Gly Ala Gly Gly Thr Ala Cys Thr Thr Cys Cys Ala Gly Gly Gly Ala
88          290          295          300
90 Gly Thr Ala Cys Ala Thr Thr Thr Cys Thr Thr Cys Thr Thr Gly Ala
91 305          310          315          320
93 Ala Ala Gly Ala Gly Ala Gly Gly Ala Ala Ala Thr Thr Cys Ala Gly
94          325          330          335
96 Gly Ala Ala Cys Thr Gly Thr Ala Cys Cys Thr Gly Gly Gly Ala Gly
97          340          345          350
99 Gly Thr Thr Gly Thr Cys Gly Thr Ala Ala Thr Gly Gly Thr Ala Ala
100          355          360          365
102 Ala Gly Gly Gly Ala Thr Thr Thr Thr Thr Cys Thr Thr Ala Ala Gly
103          370          375          380
105 Cys Ala Cys Ala Ala Ala Ala Cys Thr Thr Cys Ala Ala Gly Ala Ala
106 385          390          395          400
108 Ala Ala Ala Gly Ala Gly Ala Ala Cys Ala Gly Ala Ala Gly Ala Ala
109          405          410          415
111 Ala Ala Gly Ala Gly Ala Ala Cys Thr Gly Cys Ala Ala Ala Ala Ala
112          420          425          430
114 Ala Ala Ala Thr Cys Thr Gly Gly Ala Ala Ala Ala Gly Gly Thr Ala
115          435          440          445
117 Ala Thr Cys Thr Ala Thr Thr Thr Ala Gly Cys Ala Gly Ala Ala Gly
118          450          455          460
120 Ala Gly Thr Gly Ala Ala Ala Gly Cys Thr Gly
121 465          470          475
124 <210> SEQ ID NO: 2
125 <211> LENGTH: 610
126 <212> TYPE: PRT
127 <213> ORGANISM: Artificial Sequence
129 <220> FEATURE:
130 <223> OTHER INFORMATION: Description of Artificial Sequence: Curagen clone
132 <400> SEQUENCE: 2
133 Ala Cys Cys Ala Ala Thr Gly Gly Thr Cys Thr Cys Cys Thr Thr Gly
134 1 5 10 15
136 Cys Thr Gly Gly Thr Gly Gly Cys Ala Thr Thr Gly Gly Thr Gly Ala
137 20 25 30
139 Thr Gly Ala Thr Cys Thr Cys Cys Thr Gly Cys Cys Ala Cys Ala Thr

```

## RAW SEQUENCE LISTING

DATE: 06/10/2002

PATENT APPLICATION: US/09/732,436C

TIME: 16:25:37

Input Set : A:\Cura-611.app

Output Set: N:\CRF3\06102002\I732436C.raw

```

140          35          40          45
142 Cys Thr Ala Thr Thr Cys Cys Cys Thr Thr Thr Thr Cys Thr Gly Cys
143          50          55          60
145 Gly Ala Cys Cys Thr Gly Cys Cys Thr Asn Asn Asn Asn Asn Asn Asn
146 65          70          75          80
148 Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn
149          85          90          95
151 Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn
152          100          105          110
154 Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn
155          115          120          125
157 Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn
158          130          135          140
160 Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn
161 145          150          155          160
163 Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn
164          165          170          175
166 Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn
167          180          185          190
169 Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn Asn
170          195          200          205
172 Ala Ala Ala Gly Cys Thr Cys Ala Gly Gly Thr Gly Ala Thr Thr Thr
173          210          215          220
175 Cys Thr Gly Cys Cys Cys Thr Cys Cys Ala Thr Ala Ala Gly Ala Thr
176 225          230          235          240
178 Gly Cys Ala Cys Cys Ala Gly Cys Ala Gly Ala Thr Cys Thr Thr Cys
179          245          250          255
181 Ala Gly Cys Cys Thr Cys Thr Thr Thr Thr Thr Ala Cys Ala Cys Ala
182          260          265          270
184 Ala Gly Gly Gly Cys Thr Thr Gly Thr Cys Thr Gly Ala Thr Gly Cys
185          275          280          285
187 Thr Thr Gly Gly Ala Ala Thr Ala Gly Gly Gly Cys Cys Thr Thr Cys
188          290          295          300
190 Cys Thr Gly Gly Ala Cys Ala Ala Ala Cys Thr Cys Cys Ala Gly Ala
191 305          310          315          320
193 Cys Thr Gly Gly Ala Thr Thr Thr Cys Ala Thr Cys Ala Gly Cys Ala
194          325          330          335
196 Gly Cys Thr Gly Gly Ala Ala Gly Ala Cys Cys Thr Gly Gly Ala Gly
197          340          345          350
199 Ala Cys Cys Thr Gly Cys Thr Thr Thr Gly Gly Thr Ala Thr Ala Gly
200          355          360          365
202 Ala Gly Gly Ala Thr Gly Gly Gly Ala Ala Gly Cys Ala Ala Gly Ala
203          370          375          380
205 Gly Thr Cys Thr Gly Cys Cys Cys Thr Gly Gly Ala Ala Ala Thr Thr
206 385          390          395          400
208 Gly Ala Gly Gly Gly Cys Cys Cys Thr Ala Cys Ala Cys Thr Gly Gly
209          405          410          415
211 Cys Cys Ala Thr Ala Ala Ala Gly Ala Gly Gly Thr Ala Cys Thr Thr
212          420          425          430

```

## RAW SEQUENCE LISTING

DATE: 06/10/2002

PATENT APPLICATION: US/09/732,436C

TIME: 16:25:37

Input Set : A:\Cura-611.app

Output Set: N:\CRF3\06102002\I732436C.raw

```

214 Cys Cys Ala Gly Gly Gly Ala Gly Thr Ala Cys Ala Thr Thr Thr Cys
215      435      440      445
217 Thr Thr Cys Thr Thr Gly Ala Ala Ala Gly Ala Gly Ala Gly Ala
218      450      455      460
220 Ala Ala Thr Thr Cys Ala Gly Gly Ala Ala Cys Thr Gly Thr Ala Cys
221 465      470      475      480
223 Cys Thr Gly Gly Gly Ala Gly Gly Thr Thr Gly Thr Cys Gly Thr Ala
224      485      490      495
226 Ala Thr Gly Gly Thr Ala Ala Ala Gly Gly Gly Ala Thr Thr Thr Thr
227      500      505      510
229 Thr Cys Thr Thr Ala Ala Gly Cys Ala Cys Ala Ala Ala Cys Thr
230      515      520      525
232 Thr Cys Ala Ala Gly Ala Ala Ala Ala Gly Ala Gly Ala Ala Cys
233      530      535      540
235 Ala Gly Ala Ala Gly Ala Ala Ala Ala Gly Ala Gly Ala Ala Cys Thr
236 545      550      555      560
238 Gly Cys Ala Ala Ala Ala Ala Ala Ala Thr Cys Thr Gly Gly Ala
239      565      570      575
241 Ala Ala Ala Gly Gly Thr Ala Ala Thr Cys Thr Ala Thr Thr Thr Ala
242      580      585      590
244 Gly Cys Ala Gly Ala Ala Gly Ala Gly Thr Gly Ala Ala Ala Gly Cys
245      595      600      605
247 Thr Gly
248      610
251 <210> SEQ ID NO: 3
252 <211> LENGTH: 1887
253 <212> TYPE: DNA
254 <213> ORGANISM: Artificial Sequence
256 <220> FEATURE:
257 <223> OTHER INFORMATION: Description of Artificial Sequence: Curagen clone
258      AF038458_A
260 <400> SEQUENCE: 3
261 atggccatcc tccggttgc tctgtgctg ctgccgctgg cccctgcctc atccccaccc 60
262 cagtcagcca caccagccc atgtccccgc cgctgccgct gccagacaca gtcgctgccc 120
263 ctaagcgtgc tgtgccagg ggcaggcctc ctgttcgtgc caccctcgct ggaccgccc 180
264 gcagccgagc tgcggtggc agacaaattc atgcctccg tgcgcccgc cgacctggcc 240
265 aacatgacag gcctgctgca tctgagcctg tcgcggaaca ccatccgcca cgtggctgcc 300
266 ggcgccttcg ccgacctgc ggcctgcgt gccctgcacc tggatggcaa ccggtgacc 360
267 tcaactggcg agggccagct gcgcggcctg gtcaacttgc gccacctcat cctcagcaac 420
268 aaccagctgg cagcgtggc ggcggcgcc ctggatgatt gtgccgagac actggaggac 480
269 ctgcacctct cctacaaca cctcgagcag ctgccctggg aggcctggg ccgcctgggc 540
270 aacgtcaaca cgttgggcct cgaccacaac ctgctggctt ctgtgcccgc cggcgctttt 600
271 tccgcctgc acaagctggc ccggtggac atgacctcca accgcctgac cacaatccca 660
272 ccgacccac tcttctccc cctgcccctg ctgcaggc cccggggctc gccgcctct 720
273 gccctggtgc tggcctttg cgggaacccc ctgcaactgca actgcgagct ggtgtggctg 780
274 cgtcgctgg cgcgaggga cgacctcgag gcctgcgcgt cccacctgc tctggcgcc 840
275 cgctacttct gggcggtgg cgaggaggag ttgtctgc agccgccgt ggtgactcac 900
276 cgctcaccac ctctggctgt gccgcaggc cggccggctg cctgcgctg ccgggcagt 960
277 ggggacccag agccccgtgt gcgttgggtg tcaccccagg gccggtgct aggcaactca 1020

```

## RAW SEQUENCE LISTING

DATE: 06/10/2002

PATENT APPLICATION: US/09/732,436C

TIME: 16:25:37

Input Set : A:\Cura-611.app

Output Set: N:\CRF3\06102002\I732436C.raw

```

278 agccgtgccc gcgccttccc caatgggacg ctggagctgc tggtcaccga gccgggtgat 1080
279 ggtggcatct tcacctgcat tgcggccaat gcagctggcg aggccacagc tgctgtggag 1140
280 ctgactgtgg gtccccccacc acctcctcag ctagccaaca gcaccagctg tgaccccccg 1200
281 cgggacgggg atcctgatgc tctcacccca ccctccgctg cctctgtctt tgccaagggtg 1260
282 gccgacactg ggccccctac cgaccgtggc gtccagggtga ctgagcacgg ggccacagct 1320
283 gctcttgctc agtggccgga tcagcggcct atcccgggca tccgcatgta ccagatccag 1380
284 tacaacagct cggctgatga catcctcgtc tacaggatga tcccggcgga gagccgctcg 1440
285 ttcctgctga cggacctggc gtcaggccgg acctacgata tgtgctgct cgccgtgtat 1500
286 gaggacagcg ccacgggggt caccggccaag cggcctgtgg gctgcgcccg cttctccacc 1560
287 gaacctgcmc tgcggccatg cggggcgccg cacgctccct tcctggggcg cagcatgata 1620
288 atcgcgctgg gcggcgctcat cgtagcctcg gtactggtct tcattctcgt gctgctaata 1680
289 cgctacaagg tgcacggcgg ccagcccccc ggcaaggcca agattcccgc gcctgttagc 1740
290 agcgtttgct cccagaccaa cggcgccctg ggccccacgc ccacgcccgc cccgcccgcg 1800
291 ccggagcccg cggcgctcag ggcccacacc gtggtccagc tggactgcga gccctggggg 1860
292 cccggccacg aacctgtggg accctag 1887

```

295 &lt;210&gt; SEQ ID NO: 4

296 &lt;211&gt; LENGTH: 365

297 &lt;212&gt; TYPE: PRT

298 &lt;213&gt; ORGANISM: Equus caballus

300 &lt;400&gt; SEQUENCE: 4

```

301 Thr Cys Cys Cys Ala Gly Ala Gly Gly Cys Cys Cys Ala Gly Gly Cys
302   1                      5                      10                     15
304 Cys Gly Cys Gly Thr Cys Thr Gly Thr Cys Cys Thr Cys Cys Ala Cys
305                      20                      25                     30
307 Gly Ala Gly Ala Thr Gly Cys Thr Cys Cys Ala Gly Cys Ala Gly Ala
308                      35                      40                     45
310 Thr Cys Thr Thr Cys Ala Gly Cys Cys Thr Cys Thr Thr Cys Cys Ala
311                      50                      55                     60
313 Cys Ala Cys Ala Gly Ala Gly Cys Gly Cys Thr Cys Gly Thr Cys Thr
314   65                      70                      75                     80
316 Gly Cys Thr Gly Cys Cys Thr Gly Gly Ala Ala Cys Ala Cys Gly Ala
317                      85                      90                     95
319 Cys Cys Cys Thr Cys Cys Thr Gly Gly Ala Cys Gly Ala Ala Cys Thr
320                      100                     105                    110
322 Cys Thr Gly Cys Ala Cys Gly Gly Gly Ala Cys Thr Cys Cys Thr Thr
323                      115                     120                    125
325 Cys Gly Gly Cys Ala Gly Cys Thr Gly Gly Ala Ala Gly Ala Cys Cys
326                      130                     135                    140
328 Thr Gly Gly Ala Cys Ala Cys Cys Thr Gly Thr Thr Thr Gly Gly Ala
329 145                      150                     155                    160
331 Gly Cys Ala Gly Gly Ala Gly Ala Thr Gly Gly Gly Ala Gly Ala Gly
332                      165                     170                    175
334 Gly Ala Ala Gly Ala Ala Thr Cys Thr Gly Cys Cys Cys Thr Gly Gly
335                      180                     185                    190
337 Gly Ala Ala Cys Thr Gly Thr Gly Cys Gly Cys Cys Cys Thr Ala Cys
338                      195                     200                    205
340 Ala Cys Thr Gly Gly Cys Cys Gly Thr Gly Ala Ala Gly Ala Gly Gly
341                      210                     215                    220
343 Thr Ala Cys Thr Thr Cys Cys Gly Gly Gly Gly Gly Ala Thr Cys Cys

```

RAW SEQUENCE LISTING ERROR SUMMARY  
PATENT APPLICATION: US/09/732,436C

DATE: 06/10/2002  
TIME: 16:25:38

Input Set : A:\Cura-611.app  
Output Set: N:\CRF3\06102002\I732436C.raw

Please Note:

*FYI*

Use of n and/or Xaa have been detected in the Sequence Listing. Please review the Sequence Listing to ensure that a corresponding explanation is presented in the <220> to <223> fields of each sequence which presents at least one n or Xaa.

Seq#:8; N Pos. 12,24,41,47

Use of <220> Feature(NEW RULES):

Sequence(s) are missing the <220> Feature and associated headings.

Use of <220> to <223> is MANDATORY if <213> ORGANISM is "Artificial Sequence" or "Unknown". Please explain source of genetic material in <220> to <223> section (See "Federal Register," 6/01/98, Vol. 63, No. 104, pp.29631-32) (Sec.1.823 of new Rules)

Seq#:11

*this is an error - needs correction*

*see p.7*

*for actual sequence*

09/732436C 7

<210> SEQ ID NO 11

<211> LENGTH: 112

<212> TYPE: PRT

<213> ORGANISM: Unknown

<220> FEATURE:

<223> OTHER INFORMATION: :

<400> SEQUENCE: 11

Leu Gln Lys Ala His Val Met Ser Val Leu His Glu Met Leu Gln Gln